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09/217,595	12/22/1998	JARON Z. LANIER	5181-10802	4225

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EXAMINER

TREAT, WILLIAM M

ART UNIT	PAPER NUMBER
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2183

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**BEFORE THE BOARD OF PATENT APPEALS  
AND INTERFERENCES**

Paper No. 20

Application Number: 09/217,595  
Filing Date: 12/22/98  
Appellant(s): Lanier et al.

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Dan R. Christen  
For Appellant

**EXAMINER'S ANSWER**

This is in response to appellants' brief on appeal filed 5/14/01.

**(1) *Real Party in Interest***

A statement identifying the real party in interest is contained in the brief.

**(2) *Related Appeals and Interferences***

The brief does not contain a statement identifying the related appeals and interferences which will directly affect or be directly affected by or have a bearing on the decision in the pending appeal in the brief. Therefore, it is presumed that there are none. The Board,

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however, may exercise its discretion to require an explicit statement as to the existence of any related appeals and interferences.

**(3) *Status of Claims***

The statement of the status of the claims contained in the brief is correct.

**(4) *Status of Amendments After Final***

The appellants' statement of the status of amendments after final rejection contained in the brief is correct.

**(5) *Summary of Invention***

The summary of invention contained in the brief is correct.

**(6) *Issues***

The appellants' statement of the issues in the brief is correct.

**(7) *Grouping of Claims***

The appellants' statement in the brief that certain claims do not stand or fall together is not agreed with because appellants have failed to point out why claims 31-94 are separately patentable. Merely pointing out differences in what the claims cover is not an argument as to why the claims are separately patentable (see 37 CFR 1.192 (c7)).

**(8) *Claims Appealed***

The copy of the appealed claims contained in the Appendix to the brief is correct.

**(9) *Prior Art of Record***

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Though no prior art is relied upon by the examiner in the rejection of the claims under appeal (i.e. there is no 35 USC 102 or 103 rejection of the claims based on prior art), the examiner does reference applied prior art of record (Fisher et al. "Virtual Environment Display System") when responding to one of appellants' arguments for patentability.

**(10) *Grounds of Rejection***

The following ground(s) of rejection are applicable to the appealed claims:

Appellants' claims 1-94 are rejected under 35 U.S.C. 251.

First, appellants' claims 1-94 have a defective reissue oath.

Appellants contend that original claims 1-30 are allowable independent of whether claims 31-94 are allowed.

Whether appellants' claims may be ultimately allowable is not the issue. It is the examiner's contention that, currently, appellants have failed to identify at least one error which is relied upon to support the reissue application and they, therefore, have a defective reissue oath. On this basis, appellants' claims 1-30 have been rejected. See 37 CFR 1.175(a)(1) and MPEP § 1414.

Next, claims 31-94 are rejected under 35 U.S.C. 251 as being an improper recapture of broadened claimed subject matter surrendered in the application for the patent upon which the

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present reissue is based. See *Hester Industries, Inc. v. Stein, Inc.*, 142 F.3d 1472, 46 USPQ2d 1641 (Fed. Cir. 1998); *In re Clement*, 131 F.3d 1464, 45 USPQ2d 1161 (Fed. Cir. 1997); *Ball Corp. v. United States*, 729 F.2d 1429, 1436, 221 USPQ 289, 295 (Fed. Cir. 1984). A broadening aspect is present in the reissue which was not present in the application for patent. The record of the application for the patent shows that the broadening aspect (in the reissue) relates to subject matter that appellant previously surrendered during the prosecution of the application. Accordingly, the narrow scope of the claims in the patent was not an error within the meaning of 35 U.S.C. 251, and the broader scope surrendered in the application for the patent cannot be recaptured by the filing of the present reissue application. Appellants' independent claims 31, 66, 72, 77, 90, and 94 as well as their dependent claims are an attempt to recapture subject matter of claims 1-30 which were deliberately amended (i.e. canceled) by appellants following a rejection by the examiner.

**(11) Response to Argument**

To make clear the extent of appellants' attempt to recapture and since appellants' claims rise and fall together, the examiner has chosen to examine appellants' claim 1 in the form which the examiner allowed based on the amendment presented to overcome the prior art of record. It reads as follows.

1. A simulating apparatus comprising:

modeling means for creating a model of a physical environment in a

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computer database;

first body sensing means, disposed in close proximity to a part of a

first body, for sensing a physical status of the first body part

relative to a first reference position;

second body sensing means, disposed in close proximity to a part of a

second body, for sensing a physical status of the second body part

relative to a second reference position;

first body emulating means, coupled to the first body sensing means,

for creating a first cursor in the computer database, the first cursor

including plural first cursor nodes and emulating the physical status

of the first body part, the first body emulating means including a

first point hierarchy and a first data flow network, the first point

hierarchy for controlling a shape and an orientation of the first

cursor and for attaching each of the plural first cursor nodes

hierarchically with at least one other of the plural first cursor

nodes, the first data flow network for controlling motion of the first

cursor and the first data flow network including a first

interconnection of first input units, first function units and first

output units, the first input unit receiving the physical status of

the first body part, each first function unit including at least one

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input and at least one output and calculating, based on the at least one input, a value for each of the at least one output, and the first output units for producing position and orientation values for a portion of the plural first cursor nodes [emulating the physical status of the first body part];

first integrating means, coupled to the modeling means and to the first emulating means, for integrating the first cursor with the model;

second body emulating means, coupled to the second body sensing means, for creating a second cursor in the computer database, the second cursor including plural second cursor nodes and emulating the physical status of the second body part, the second body emulating means including a second point hierarchy and a second data flow network, the second point hierarchy for controlling a shape and an orientation of the second cursor and for attaching each of the plural second cursor nodes hierarchically with at least one other of the plural second cursor nodes, the second data flow network for controlling motion of the second cursor and the second data flow network including a second interconnection of second input units, second function units and second output units, the second input units receiving the physical status of the second body part, each second function unit including at

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least one input and at least one output and calculating, based on the  
at least one input, a value for each of the at least one output, and  
the second output units for producing position and orientation values  
for a portion of the plural second cursor nodes [emulating the physical status of the second  
body part]; and  
second integration means, coupled to the modeling means and to the  
second body emulating means, for integrating the second cursor with  
the model.

Appellants presented the same basic amendment underlined in claim 1 in each of their independent claims of original Patent No. 5,588,139 to overcome the art of record. That language is conspicuously missing from all of their new independent claims. Appellants' elimination from the new reissue claims of the amendment in the original patent presented to overcome the prior art of record constitutes recapture of surrendered subject matter. Therefore, each of appellants' new claims, all of which omit this surrendered subject matter, can be seen to constitute recapture.

In defense of their recapture efforts appellants have advanced three major arguments on their behalf.

First appellants have argued only the language argued by appellants as distinguishing over the prior art in the original application should be considered as a limitation to their broadening of their claim language and not the complete language of their amendment. The



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examiner would remind appellants there is an Examiner Interview Summary Record (paper no. 14, mailed 2/9/96) stating the examiner had agreed to addition of material to the specification taken from appellants' appendix to support the new claim language appellants were going to submit. The added claim language was not introduced on a whim nor was appellant required to add more language than necessary to render his claims patentable. Also, virtually the exact same language was added to each of appellants' original independent claims and never the much more limited language appellants argued. Finally, the examiner would note that self-serving arguments are typically given little weight by the courts.

Second, appellants have argued in support of rejected claims 31-94:

Deliberately canceling or amending a claim in an effort to overcome a reference strongly suggests that the applicant admits that the scope of the claim before the cancellation or amendment is unpatentable, but it is not dispositive because other evidence in the prosecution history may indicate to the contrary. *In re Clement*, 45 USPQ.2d 1161, 1164 (Fed. Cir.1997).

The facts are that the examiner applied a rejection and appellants amended (i.e. canceled) all 30 claims because they failed to distinguish over the prior art of record. They then presented the full language noted above as an amendment to each of their claims in order to overcome the prior art of record. There is no probative evidence in the prosecution history to suggest otherwise.

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Finally, appellants have argued:

As noted in *Chisum on Patents*, a patentee may obtain on reissue a claim that varies materially from the claim originally surrendered even though it omits a limitation intentionally added to obtain issuance of the patent.

They have then argued specific language for specific claims as representing material differences from the original claims.

For claim 36 they recite “wherein the second set of data is received across a network”. Claim 1 of the patent (lines 31-39) recites “the second data flow network including a second interconnection of second input units receiving the physical status of the second body part... Only if one ignores the cited language of claim 1 and equivalent language in claims 26 and 30 could one possibly conclude the language recited in claim 36 differs materially in any way from that of claims 1, 26, and 30.

For claim 37 appellants recite “an Ethernet link, a phone link, an ISDN link, or a satellite link”. These are all prior art forms of networks for which appellants have supplied no specific enablement in their specification other than to merely recite them. Therefore, appellants must be depending upon the knowledge of one of ordinary skill to implement these conventional forms of networks. Given that using conventional network forms implemented by individuals of ordinary skill does not constitute patentable differentiation, it is ridiculous to argue the language constitutes a material difference.

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For claim 44 appellants recite “machines, articles of manufacture, animals, molecules...” Original claims 7 and 9 which were canceled recite a “virtual object”. Original claims 19 and 25 which were canceled recite “human being”. Figures 9, 11, and 12 of applied prior art reference Fisher et al. show a virtual world populated by various shapes, machines, articles of manufacture, etc. The concept behind a virtual world is that it can be populated by anything for which one has the imagination and computing power. Once again, what appellants propose as a material difference is merely conventional.

For claim 68 appellants recite “one or more audio display devices configured to produce three-dimensional sounds. This was claimed in amended (i.e. canceled) original claim 23 which has two audio devices presenting the sound model (i.e, three-dimensional sounds) to a user’s two ears.

For claim 69 appellants argue a material difference based on various forms of body part sensing means. Claim 1 recites an equivalent body sensing means, and its dependent claims 27-29 recite many of the specific means recited in claim 69. Once again, appellants argue trivial differences as material differences.

For claim 94 appellants recite “modify a virtual three-dimensional work piece based on the motion of the first cursor within the virtual world”. If this were a material difference, then the language of original claim 7 reciting “wherein the model includes a virtual object, and further comprising first object manipulating means, coupled to the first body emulating means,

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for manipulating the virtual object with the first cursor in accordance with corresponding gestures” should have prevailed over the prior art. Yet, it failed to do so.

Finally, appellants would have us believe that their system claimed as software embodied on a computer-readable medium or as a kit constitutes a material difference justifying omission of limitations. Anyone who reads claim 1 and its dependents in light of appellants’ specification readily recognizes the claims encompass both the hardware and software of appellants’ system and would prohibit any claim to appellants’ invention by someone who merely copied appellants’ system software onto a computer-readable medium or who boxed up the hardware and software components of appellants’ system and termed them a kit. Anyone of even less than ordinary skill at the time of appellants’ invention would have realized that appellants’ software could be placed on a machine-readable medium and, in fact, must have been on a machine-readable medium for appellants’ invention to operate. Also, packaging software and computer hardware together and marketing them as a system, what appellants are calling a kit, was a conventional practice at the time of appellants’ invention. The examiner takes Official Notice that computers with operating systems and related software were being marketed as systems (i.e. kits) at the time of appellants’ invention as well as more specialized systems containing both hardware and software which were frequently referred to as turn-key systems. While appellants may wish to secure software-on-a-machine-readable-medium and kit claims to simplify enforcement of appellants’ claims, such language represents only a trivial difference and does not justify omission of material limitation(s).

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For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,



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WMT  
December 12, 2001

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